M5 - Stem and Leaf Plots. Name:

Q1. The following stem and leaf plot shows the lengths, in cm, of a sample of 15 leaves from a tree. The values are given correct to 1 decimal place.

4	**3**
5	**4 0 7 3 9**
6	**3 1 2 4**
7	**6 1 6**
8	
9	**3 2** **Key: 7|6 = 7.6cm**

a) Write the data in full
b) State whether the data is (i) qualitative or quantitative (ii) discrete or continuous

Q2. Construct a stem and leaf plot from the following data set. The speeds, in kilometers per hour, of 20 cars, measured on a city street.

41, 15, 4, 27, 21, 32, 43, 37, 18, 25, 29, 34, 28, 30, 25, 52, 12, 36, 6, 25

a) What is the median of the data?
b) What is the range of the data?

Q3. Construct a stem and leaf plot for the following: the times taken in hours, to carry out repairs to 17 pieces of machinery.

0.9, 1.0, 2.1, 4.2, 0.7, 1.1, 0.9, 1.8, 0.9, 1.2, 2.3, 1.6, 2.1, 0.3, 0.8, 2.7, 0.4

a) What is the median time to repair the machinery?

b) What is the range time to repair the machinery?

c) What is the mean time to repair the machinery?

d) Find the standard deviation of the time it takes to repair the machinery?

e) What is the interquartile range of the time it takes to repair the machinery?

f) By looking at the stem and leaf plot what can you say about the skewness of the data?